## STANDARDS FOR USE OF INTERACTIVE VIDEO TECHNOLOGY IN CONDUCTING INVOLUNTARY COMMITMENT, CHILD PROTECTIVE, AND JUVENILE DELINQUENCY HEARINGS IN PILOT COURTS

In Mich Sup Ct AO 2001-4, the Michigan Supreme Court authorized the piloting of interactive video technology (IVT) use in certain involuntary commitment, child protective, and juvenile delinquency proceedings in a specified number of Probate Courts and family divisions of Circuit Courts. Interested courts should submit a request along with a local administrative order outlining the planned administrative procedures to the State Court Administrator. Model Local Administrative Order 13b is published in the Michigan Court Administration Reference Guide.

Video hearings from off-site locations to the court require a means of transmission. There are four principle methods: 1) an integrated services digital network (ISDN) telephone line(s); 2) a T-1 connection; 3) fiber optics; and 4) microwave. Each method has advantages and disadvantages.

▶ ISDN is a dial-up service available through the phone company. In ISDN IVT use, each location receiving and transmitting audiovisual signals has the ISDN service installed, which involves the use of multiple transmission channels supporting data, voice, control, and signaling information. ISDN is generally available in most urban areas.

Since ISDN is a service, its use involves a constant, if modest, service cost. In addition, the ISDN user will pay for each use of the system. Although ISDN is technically capable of producing a high quality audiovisual display, this can be achieved only by employing a possibly cost-prohibitive number of phone lines. Usually, this service is used with a quantity of phone lines capable of producing a range of mid-grade displays.

ISDN may be good for a situation where many different locations are to be used and/or where each location in the system is used on a less than constant basis. Also, ISDN will be an option if a servicable, less than broadcast quality audiovisual display is acceptable.

► **T-1** is a dedicated phone connection service (using a bundle of 24 trunk lines) available through the phone company. In T-1 IVT use, each location receiving and transmitting audiovisual signals has the T-1 service installed.

Since T-1 is a service, its use involves a constant service cost. Unlike ISDN connections, a T-1 connection does not require dialling phone numbers and does not involve a cost for each use of the system. However, because the connection is a dedicated link from one point to another, the blanket service cost is higher than the constant service cost associated with ISDN. Depending upon what portion of the 24-line T-1 connection is devoted to IVT (some portions of the connection may be used for regular phone service or data transfer), the audiovisual display achieved will vary from the mid-grade results associated with usual ISDN use to a near broadcast quality picture and sound.

A T-1 connection may be a good option for a court using IVT to a single outside location and/or where there is a high volume of IVT use to outside locations. T-1 also provides some flexibility in the quality of audiovisual display achievable.

► IVT through **fiber optics** is, like ISDN, a dial-up service over phone lines. However, unlike ISDN, this option involves the availability of a fiber optical line connecting each location receiving and transmitting audiovisual signals. Because of fiber's almost limitless capacity for transmitting signals, IVT can be used over it at transmission speeds allowing for a broadcast quality audiovisual display.

If a fiber optical line must be installed in order to establish the connection, such installation will involve a relatively high cost. If, though, the connection already exists, then it can be used with a minimal recurring service cost and cost associated with each use of the line.

If use of fiber optics would require the installation of a fiber optical line, fiber optics would be a reasonable IVT option only if the price paid were suitably offset (perhaps by the ability to use the connection for a variety of communication forms).

• Microwave IVT connection involves the use of a microwave receiver and transmitter at each location linked in the system. In order to operate properly, the receiver and transmitter at each site must be connected by a line-of-sight visual path.

Since microwave IVT involves the propagation of signals through the medium of air, rather than through some physical medium of copper wire or fiber optical line, the only cost associated with use is the cost of the electricity to produce and receive the microwaves. However, if microwave transmitters and receivers must be installed before the system can be used, such installation will be costly. A microwave IVT system will produce a broadcast quality audiovisual display.

Like fiber optics, microwave is a good IVT option if the installations required for operation of the system have already been made. Otherwise, microwave may not be a cost-effective IVT option.

Regardless of which means of transmission is used, when IVT is used in involuntary commitment proceedings, the system used must have a minimum transmission speed of 384 kilobits per second, and a minimum frame "refresh" speed of 30 frames per second.

Upon SCAO approval, those courts with a video record system in place can adapt their system to allow for site-to-site video hearings and recordings. The system should allow for multiple screen viewing (defendant, judge, prosecutor, and defense attorney) and have viewing available both in the courtroom and at the jail. Once the means of transmission is in place, minor program adjustments to the recording system should allow video hearings from off-site locations to the court to take place.